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Taxonomic Relationships of Two Species of *Rhacophorus* from Vietnam (Amphibia, Rhacophoridae)

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Abstract: *Rhacophorus notater* Smith, 1924, described from a single juvenile, is regarded as conspecific with *R. annamensis* Smith, 1924. Both species were described from the same locality in Vietnam. Although the name *R. notater* appears before *R. annamensis* in the same publication, *R. annamensis* is more popular in name among herpetologists, and its biological details are better clarified than those of *R. notater*. Thus, I propose to treat *R. notater* as a junior synonym of *R. annamensis*.

Key words: Ontogenetic color change; *Rhacophorus annamensis*; *Rhacophorus notater*; Synonymy; Taxonomy; Vietnam

Rhacophorus annamensis was described from Daban (alt. 200 m), Phan Rang Province, S. Annam (=Vietnam) by Smith (1924). The species was once regarded as a subspecies of *R. pardalis* (Wolf, 1936; Bourret, 1942). *Rhacophorus annamensis*, however, is morphologically quite distinct from *R. pardalis* Günther, 1859, and is now considered a good species (Inger, 1954; Inger et al., 1999). Smith (1924) also described another, more enigmatic rhacophorid, *R. notater*, from the same locality as *R. annamensis* (Daban, alt. 200 m) in the same publication.

My examination of the type of *R. notater* Smith, 1924, deposited in the Natural History Museum, London (BM 1947.2.8.83=1924.1.31.3, originally M. Smith 2797), confirmed that the individual is just metamorphosed with

the trace of a tail stub. The specimen has a snout-vent length (SVL) of 19.0 mm, a tibia length of 10.6 mm, and a head width of 6.7 mm. The body is pale gray brown with discrete dark brown blotches on the back (Fig. 1).

A photograph of a juvenile *R. annamensis* just after metamorphosis (Abb. 6 of Ryboltovsky, 1999: 12) clearly shows that the young of this species have a body color quite different from that of adults. Ryboltovsky (1999) described the ground color of the body as bright gray or whitish, with large black spots. This peculiar color pattern is quite similar to that of *R. notater*. Indeed Wolf (1936) suspected that *R. notater* was a young *R. annamensis*.

Ryboltovsky (1999) reported the size at metamorphosis of reared individuals to range from 12 to 14 mm in SVL, and this size range is smaller than the size of *R. notater*. However, the size at metamorphosis varies greatly in anurans according to the conditions the tadpoles have experienced. In contrast, the body color varies less evidently than the body size (my unpublished data).

Recently, Orlov et al. (2002: 96) noted close similarity of body color between *R. notater* and young *R. annamensis*, and listed only *R. annamensis* in their checklist of Vietnamese amphibians, omitting *R. notater*.

I fully agree with Orlov et al. (2002) in that the two species are very similar, and further consider them to be conspecific. Although Smith (1924) described *R. notater* on page 227 before *R. annamensis* on page 229 of the same paper (Proc. Zool. Soc. London, 1924), *R. annamensis* is more popular in name and its biological details are better established (e.g., Inger et al., 1999) than those of *R. notater*. Therefore, I herewith formally propose to relegate *R. notater* in the synonymy of *R. annamensis*.

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FIG. 1. *Rhacophorus notater*. Dorsal (top left), ventral (top right) and lateral (bottom) views of the holotype.

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